

Response Definitions

Sub-Committee on Disease-Specific
Methods And Strategies For Monitoring
Relapse Following Allogeneic Stem
Cell Transplantation

Definitions: Goals

Working vs proposed vs research definitions

Define the following in regard to post-SCT setting

- Response
- Persistence
- Progression
- Relapse
- Relapse prediction

Disease-specific

- AML
- MDS
- ALL
- Lymphoma
- CML
- CMPD
- CLL
- MM

AML

Revised criteria: AML International Working Group
(Cheson, JCO 2003)

Parameters	Complete remission	Relapse
Morphological/ hematological criteria	BM blasts <5%; platelets $\geq 100 \times 10^9/L$; neutrophils $\geq 1.0 \times 10^9/L$	Reappearance of blasts post CR in BM/PB
Cytogenetic criteria	Disappearance of cytogenetic alteration	Reappearance of cytogenetic alteration
Molecular remission	Disappearance of molecular mutation	Reappearance of molecular mutation
Flow cytometry	Disappearance of cells with previously determined LAIP	Reappearance of cells with LAIP

(BM: bone marrow; PB: peripheral blood; LAIP: leukemia associated immunophenotype)

Discussion points

Deficiencies of current table

- No thresholds for “disappearance” or “reappearance”
- Impact of specific molecular markers vary
- Chimerism not included
- ? Cri
- CIBMTR criteria
- Issues uniform surveillance, methodology availability

MDS

Revised criteria: MDS International Working Group
(Cheson, Blood 2006)

Criteria of remission	Parameters
Morphologic and hematological response	Complete remission (CR): bone marrow blasts <5% without dysplasia, hemoglobin ≥ 11 g/dL, platelets $\geq 100 \times 10^9/L$, neutrophils $\geq 1.5 \times 10^9/L$ Partial remission (PR): reduction of blasts by at least 50% or achievement of lower risk category than prior to treatment
Cytogenetic response	Major cytogenetic response: disappearance of a cytogenetic abnormality. Minor cytogenetic response: $\geq 50\%$ reduction of abnormal metaphases
Quality of life	Clinical improvement in physical/social function and well-being
Hematologic improvement	Specific responses of cytopenias in the 3 hematopoietic lineages

Discussion points

Deficiencies of current table

- No definitions for relapse
- No molecular definitions, chimerism
- Clonal recurrences, (incl evolution)